## AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings of claims in the application:

## LISTING OF CLAIMS:

- 1. (currently amended) Secure electronic entity (11) including means (23) adapted to store one or more objects, which entity is characterized in that it said secure electronic entity includes:
- measuring means (18) for measuring the <u>a</u> time that has elapsed from a reference time of day (Dref) associated with said object,
- storage means  $\frac{(19)}{(19)}$  for storing a lifespan  $\frac{(V)}{(19)}$  assigned to said object, the storage means  $\frac{(19)}{(19)}$  co-operating with the time measuring means  $\frac{(18)}{(18)}$  to compare the elapsed time and said lifespan  $\frac{(V)}{(19)}$ , and
- updating and invalidation means (21) for updating said lifespan of the object or to render the object temporarily or permanently unusable if the <u>a</u> result of said comparison is that the elapsed time has reached or passed the lifespan (V).
- 2. (currently amended) Secure electronic entity (11) according to Claim 1, characterized in that wherein said lifespan (V) corresponds to the a total time of real use of the object.
- 3. (currently amended) Secure electronic entity  $\frac{(11)}{(11)}$  according to Claim 1, characterized in that wherein said lifespan  $\frac{(V)}{(11)}$  is a time period independent of the  $\underline{a}$  total time of real use of the object.
- 4. (currently amended) Secure electronic entity (11) according to Claim 1, characterized in that wherein the time

measuring means (18) are adapted to provide a measurement of the time that has elapsed since the reference time of day (Dref) when the electronic entity (11) is not supplied with power by an external power supply.

- 5. (currently amended) Secure electronic entity  $\frac{(11)}{(11)}$  according to Claim [[1]]  $\frac{2}{(11)}$ , characterized in that wherein the time measuring means  $\frac{(18)}{(18)}$  are adapted to supply a measurement of the time that has elapsed since the reference time of day  $\frac{(Dref)}{(Dref)}$  when the electronic entity  $\frac{(11)}{(11)}$  is not supplied with electrical power.
- 6. (currently amended) Secure electronic entity (11) according to claim 1, characterized in that wherein the time measuring means (18) are adapted to supply a measurement of the time that has elapsed since the reference time of day (Dref) independently of any external clock signal.
- 7. (currently amended) Secure electronic entity  $\frac{(11)}{(11)}$  according to claim 1, characterized in that wherein the time measuring means  $\frac{(18)}{(11)}$  include means for comparing two times of day.
- 8. (currently amended) Secure electronic entity (11) according to claim 1, characterized in that wherein the means (19) for storing the lifespan (V) include [[a]] another secure entity and are situated inside or outside said secure electronic entity (11).
- 9. (currently amended) Secure electronic entity (11) according to claim 1, characterized in that wherein the object is an operating system, a secret code, a file, a file system, an application or access rights.

Docket No. 0579-1089 Appln. No. 10/536,493

- 10. (currently amended) Secure electronic entity  $\frac{(11)}{(11)}$  according to claim 1, characterized in that wherein the reference time of day  $\frac{(Dref)}{(Dref)}$  is the <u>a</u> time of day of creation of the object.
- 11. (currently amended) Secure electronic entity (11) according to claim 1, characterized in that it includes further comprising one or more subsystems (17) comprising:
- a capacitive component (20)—subject to leakage across it's a—dielectric space of the capacitive component, means being provided for coupling said capacitive component to an electrical power supply to be charged by said electrical power supply, and
- means (22) for measuring the <u>a</u> residual charge in the capacitive component (20), said residual charge being at least in part representative of the time that has elapsed since the capacitive component (20) was decoupled from the electrical power supply.
- 12. (currently amended) Secure electronic entity  $\frac{(11)}{(12)}$  according to claim 11, characterized in that wherein said means  $\frac{(22)}{(22)}$  for measuring the residual charge are included in said time measuring means  $\frac{(18)}{(22)}$ .
- 13. (currently amended) Secure electronic entity (11) according to Claim 11, characterized in that wherein the capacitive component (20) is an MOS a metal oxide semiconductor (MOS) capacitor whose dielectric space consists of a silicon oxide.
- 14. (currently amended) Secure electronic entity (11) according to Claim 11, characterized in that wherein the means (22) for measuring the residual charge comprise a field-effect transistor (30) having an insulative layer (34), the capacitive component (20) includes an insulative layer (24), and the a

thickness of the insulative layer (34) of the field-effect transistor (30) is significantly greater than the <u>a</u> thickness of the insulative layer (24) of the capacitive component (20).

- 15. (currently amended) Secure electronic entity (11) according to claim 14, characterized in that wherein the thickness of the insulative layer (24) of the capacitive component (20) is from 4 to 10 nanometers.
- 16. (currently amended) Secure electronic entity (11) according to Claim 13, characterized in that it includes further including: at least two subsystems (17A, 17B) each comprising:
- a capacitive component subject to leakage across its
  a dielectric space of said capacitive component,
- means enabling said capacitive component to be coupled to an electrical power supply in order to be charged by said electrical power supply, and
- means for measuring the residual charge in the capacitive component, said residual charge being at least in part representative of the time which has elapsed after the capacitive component was decoupled from the electrical power supply, said subsystems (17A, 17B) comprising capacitive components having different leaks across their respective dielectric spaces of said capacitive components, and said secure electronic entity (11) further including means (14, 15, T) for processing respective measured residual charges in said capacitive components to extract from said measurements information substantially independent of heat input to said entity (11) during the time that has elapsed since the reference time of day (Dref).
- 17. (currently amended) Secure electronic entity  $\frac{(11)}{(11)}$  according to claim 16, characterized in that wherein said processing means  $\frac{(14, 15, T)}{(11)}$  include software for calculating a predetermined function for determining said information as a

Docket No. 0579-1089 Appln. No. 10/536,493

function of said measurements and substantially independently of heat input.

- 18. (currently amended) Secure electronic entity (11) according to claim 1, characterized in that it is configured as a microcircuit card.
- 19. (currently amended) Secure electronic entity (11) according to claim 1, characterized in that it is configured as a Personal Computer Memory Card International Architecture (PCMCIA) card.
- 20. (currently amended) Secure electronic entity (11) according to Claim 12, characterized in that wherein the capacitive component (20) is an MOS a metal oxide semiconductor (MOS) capacitor whose dielectric space consists of a silicon oxide.